```
import pandas as pd
df = pd.read_csv('pizza sales.csv')
df
```

	order_details_id int... 1 - 48620	quantity int64 1 - 4	order_date object	order_time object	unit_price float64	total_price float64
0	1	1	01-01-2015	11:38:36	13.25	13.25
1	2	1	01-01-2015	11:57:40	16	16
2	3	1	01-01-2015	11:57:40	18.5	18.5
3	4	1	01-01-2015	11:57:40	20.75	20.75
4	5	1	01-01-2015	11:57:40	16	16
5	6	1	01-01-2015	11:57:40	20.75	20.75
6	7	1	01-01-2015	12:12:28	16.5	16.5
7	8	1	01-01-2015	12:12:28	20.75	20.75
8	9	1	01-01-2015	12:16:31	16.5	16.5
9	10	1	01-01-2015	12:21:30	16.5	16.5

48620 rows, 10 cols, showing 10 rows/page Page 1 of 4862

```
describe table 'pizza sales.csv'
```

	column_name object	column_type object	null object
	order_details... 10% quantity 10% 8 others 80%	VARCHAR 40% BIGINT 20% 3 others 40%	YES 100%
0	order_details_id	BIGINT	YES
1	quantity	BIGINT	YES
2	order_date	DATE	YES
3	order_time	TIME	YES
4	unit_price	DOUBLE	YES
5	total_price	DOUBLE	YES
6	pizza_size	VARCHAR	YES
7	pizza_category	VARCHAR	YES
8	pizza_ingredients	VARCHAR	YES
9	pizza_name	VARCHAR	YES

Page 1 of 1
10 rows, 6 cols, showing 10 rows/page

```
SELECT *
FROM 'pizza sales.csv'
```

	order_details_id int... 1 - 48620	quantity int64 1 - 4	order_date da
0	1	1	2015-01-01 0
1	2	1	2015-01-01 0
2	3	1	2015-01-01 0
3	4	1	2015-01-01 0
4	5	1	2015-01-01 0
5	6	1	2015-01-01 0
6	7	1	2015-01-01 0
7	8	1	2015-01-01 0
8	9	1	2015-01-01 0
9	10	1	2015-01-01 0

Page 1 of 4862
48620 rows, 10 cols, showing 10 rows/page

```sql
-- Which pizza  category have highest sales

SELECT pizza_category, sum(total_price) as total_sales
FROM 'pizza sales.csv'
group by pizza_category
order by total_sales desc;
```

	pizza_category obj...	total_sales float64
0	Classic	220053.1
1	Supreme	208197
2	Chicken	195919.5
3	Veggie	193690.45

4 rows, 2 cols, showing 10 rows/page Page 1 of 1

```sql
-- which product have highest  sales, and its quantity and count

SELECT pizza_name, count(pizza_name) as pizza_count, sum(quantity) as total_quantity, sum(total_price) a
from 'pizza sales.csv'
group by pizza_name
order by total_sales desc;
```

	pizza_name object The Thai Chi... 3.1% The Barbecu... 3.1% 30 others 93.8%	pizza_count int64 480 - 2416	total_quantity float... 490.0 - 2453.0	total_sales float64 11588.499999999...
0	The Thai Chicken...	2315	2371	43434.25
1	The Barbecue Ch...	2372	2432	42768
2	The California Chi...	2302	2370	41409.5
3	The Classic Delux...	2416	2453	38180.5
4	The Spicy Italian ...	1887	1924	34831.25
5	The Southwest C...	1885	1917	34705.75
6	The Italian Supre...	1849	1884	33476.75
7	The Hawaiian Pizza	2370	2422	32273.25
8	The Four Cheese ...	1850	1902	32265.7
9	The Sicilian Pizza	1887	1938	30940.5

32 rows, 4 cols, showing 10 rows/page Page 1 of 4

```sql
-- how many orders are late wihch is like the delivery time is more than 30 minutes and its percentage

SELECT count(order_details_id) as number_of_late_orders , round(((SELECT count(order_details_id) as numb
from 'pizza sales.csv'
where minute(order_time) > 30
)/ (SELECT count(order_details_id) as number_of_orders
from 'pizza sales.csv'
)) *100, 2) as percentage_of_late_orders
from 'pizza sales.csv'
where minute(order_time) > 30

order by number_of_late_orders DESC;
```

	number_of_late_or...	percentage_of_lat...
0	23506	48.35

1 row, 2 cols, showing 10 rows/page Page 1 of 1

```sql
which month and day have high sales and orders

CT concat(day(order_date), '-' ,month(order_date)) as  order_month_day,count(order_details_id) as total_qu
n 'pizza sales.csv'
UP BY order_month_day
ER BY total_quantity desc , total_sales desc;
```

	order_month_day o... 26-11 0.3% 27-11 0.3% 356 others 99.4%	total_quantity int64 73 - 261	total_sales float64 1259.25 - 4422.44...
0	26-11	261	4405.95
1	27-11	259	4422.45
2	15-10	258	4320.2
3	4-7	233	3864.2
4	3-7	207	3443
5	15-5	205	3386.15
6	1-10	190	3202.15
7	24-7	188	3204.4
8	1-2	188	3189.2
9	6-11	185	3157.5

358 rows, 3 cols, showing 10 rows/page Page 1 of 36

```sql
-- which month have high sales and orders

SELECT month(order_date) as order_month, count(order_details_id) as number_of_orders, sum(total_price) a
from 'pizza sales.csv'
group by order_month
order by  total_sales desc;
```

	order_month int64 1 - 12	number_of_orders i... 3797 - 4301	total_sales float64 64027.599999999...
0	7	4301	72557.9
1	5	4239	71402.75
2	3	4186	70397.1
3	11	4185	70395.35
4	1	4156	69793.3
5	4	4067	68736.8
6	8	4094	68278.25
7	6	4025	68230.2
8	2	3892	65159.6
9	12	3859	64701.15

12 rows, 3 cols, showing 10 rows/page Page 1 of 2

```sql
-- how many customers have more number of orders

SELECT order_details_id, max(quantity)
from 'pizza sales.csv'
GROUP BY order_details_id
order by max(quantity) desc
limit 10;
```

	order_details_id int... 184 - 35497	max(quantity) int64 3 - 4
0	11977	4
1	18876	4
2	35497	4
3	184	3
4	342	3
5	903	3
6	5895	3
7	7105	3
8	16831	3
9	18318	3

10 rows, 2 cols, showing 10 rows/page Page 1 of 1

```sql
-- which pizza size have highest amoth of sales

SELECT pizza_size, count(quantity), sum(total_price) as total_sales
from 'pizza sales.csv'
group by pizza_size
order by total_sales desc;
```

	pizza_size object	count(quantity) int...	total_sales float64
0	L	18526	375318.7
1	M	15385	249382.25
2	S	14137	178076.5
3	XL	544	14076
4	XXL	28	1006.6

5 rows, 3 cols, showing 10 rows/page Page 1 of 1

```sql
-- month wise sales grouth
SELECT
    order_month,
    total_sales,
    (total_sales - LAG(total_sales) OVER(ORDER BY order_month)) / LAG(total_sales) OVER(ORDER BY order_m
FROM (
    SELECT
        MONTH(order_date) AS order_month,
        SUM(total_price) AS total_sales
    FROM 'pizza sales.csv'
    GROUP BY MONTH(order_date)
) AS monthly_sales;
```

	order_month int64 1 - 12	total_sales float64 64027.599999999...	sales_growth float... -0.0808888655287...
0	1	69793.3	nan
1	2	65159.6	-0.06639175967
2	3	70397.1	0.08037956034
3	4	68736.8	-0.02358477835
4	5	71402.75	0.03878490125
5	6	68230.2	-0.04443176208
6	7	72557.9	0.06342792488
7	8	68278.25	-0.05898255049
8	9	64180.05	-0.06002204216
9	10	64027.6	-0.002375348726

12 rows, 3 cols, showing 10 rows/page Page 1 of 2